US Army Corps of Engineers

USACE Enterprise GIS Initiative

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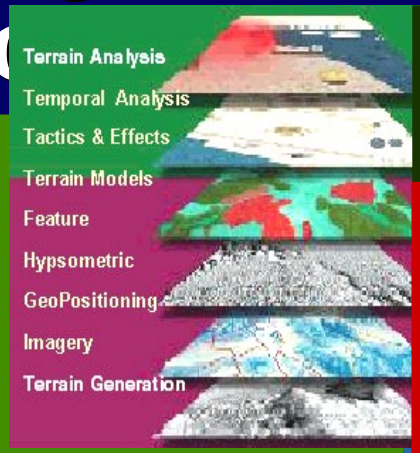
The US Army Corps of Engineers

Military Programs

- MILCON: Army and AF
- Base operations
- Environmental restoration
- Geospatial Engineering



Research & Development

- Military engineering
- Terrain & Geospatial
- Installations & Environment
- Water Resources

Real Estate

- Acquire, manage & dispose
- DOD recruiting facilities
- Contingency operations

Interagency

- DOD, Federa
- State & Loca
- Internationa

Civil Works

- Navigation, Hydropower
- Flood control, Shore Protection
- Disaster response
- Environmental restoration
- Water Supply
- Regulatory

Plus: *Homeland Security*

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Enterprise GIS Requirements a.k.a Geospatial Nirvana

- Want access to everything whenever I need it . Extensive Base Map Data
- Data is entered once for everyone to use (field data entered into a Enterprise Database, HQ has a view into the Database)
- Need to share information (but not all of it) with public, other government agencies .. Etc.
- Link information to a geographic coordinate (documents, CADD files, etc.), but have plans for more GIS analysis/decision support
- Want everything fast
- Don’t want to pay a lot for it

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- **Establishing and maintaining the IT infrastructure to support the geospatial requirements from mission areas.**

Thoughtful robust design process

vs.

Short term need to show capabilities

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How do We Get There

- **Establish the Reuse of Data and Software as a Priority**
  - **Through Database Standardization and Standardizing Geospatial Business Processes in Mission Areas**
  - **Open/easy Access documented in the Corps Enterprise Architecture**
- **Leveraging Existing Infrastructure, Programs, People**

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Why EGIS?

- Technology Advancements – it is not cost effective to continue to implement the technology by project, office, stovepipe
- Supports USACE's Watershed Strategic Plan
- Supports Virtual Teaming
- OMB and GAO Direction
  - President's Management agenda and Geospatial One Stop

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USACE EGIS Challenges … but not Barriers

- USACE Highly Distributed Organization
- Project Based Funding. No Mapping Mission.
- I need this capability today to meet my customer's requirement.
- Organizational Stovepipes .. We've always done it this way before.

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EGIS Strategy – Hit from All Angles

- High level "guidance"
  - DCG EGIS Memorandum, 2 July 2004
  - 2006 Budget EC
- Define the Geospatial Architecture to Promote Communication within the GIS Development ("Geek") Community
- Work with Functional Propoents/CoP Leads to define requirements and develop strategies to move forward

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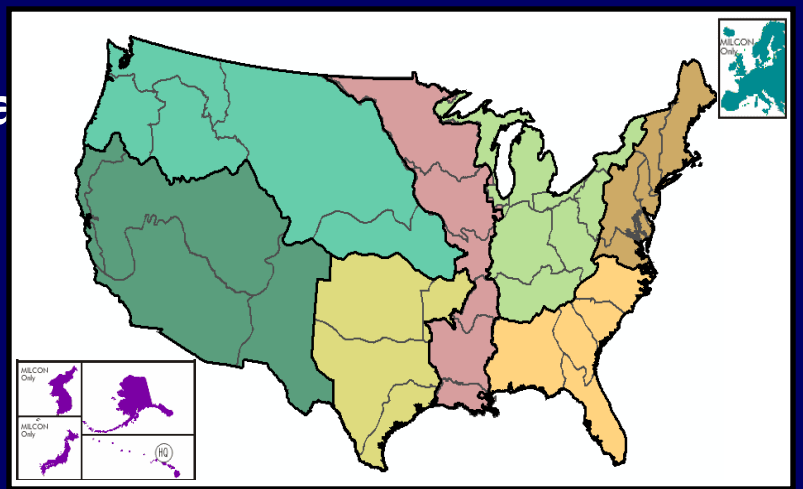
Goals of Regional GD&S Integration

- **Provide a stable geographic information platform**
  - **Execution of all Corps missions**
  - **Development of applications, models, and analysis**
- **Provide an "Organizational and Application Framework" for the deployment and management of geospatial technologies**
- **Manage geospatial data as a resource to be protected over space and time**



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Enterprise GIS MSC Managers

- NAD William Rogers
- SAD Gary Mauldin
- LRD Robert Iseli
- MVD Jack Smith (From MVK, Acting)
- SWD John Morris
- NWD Dale Munger
- SPD Neil Nelson
- POD Thomas Taam

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Inland Electronic Navigation Charts

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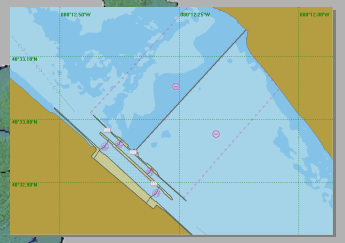
Current IENC Coverage

Approximately 3,200 miles of initial S-57 charts compiled from surveys and channel information:

- **Mississippi River (Baton Rouge to Rock Island)**
- **Ohio River**
- **Red River**
- **Atchafalaya River**
- **Black Warrior - Tombigbee**



Daschields L&D, Pittsburgh

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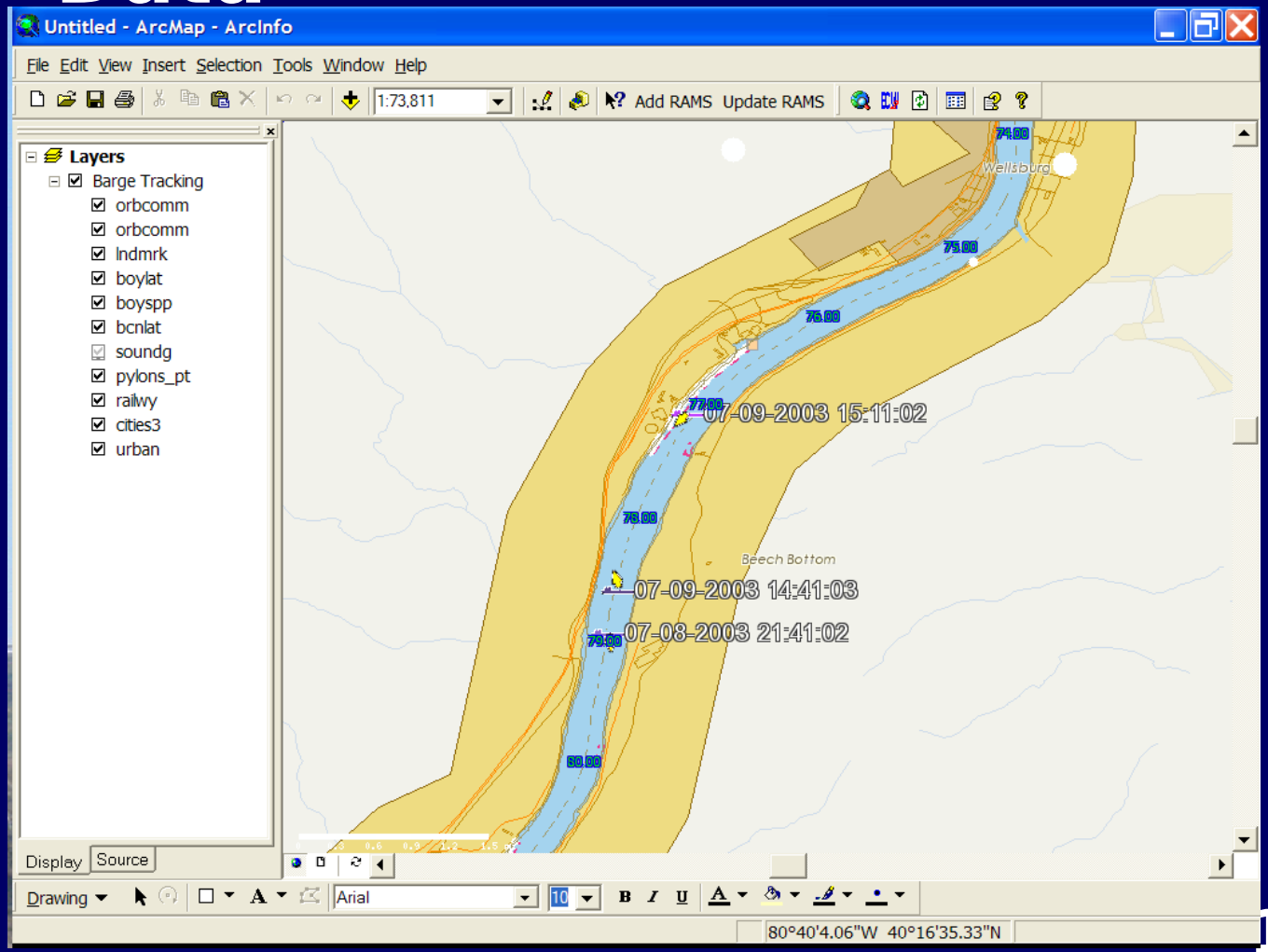
Real-time Tracking of Cargo Using IENC as the Base Data



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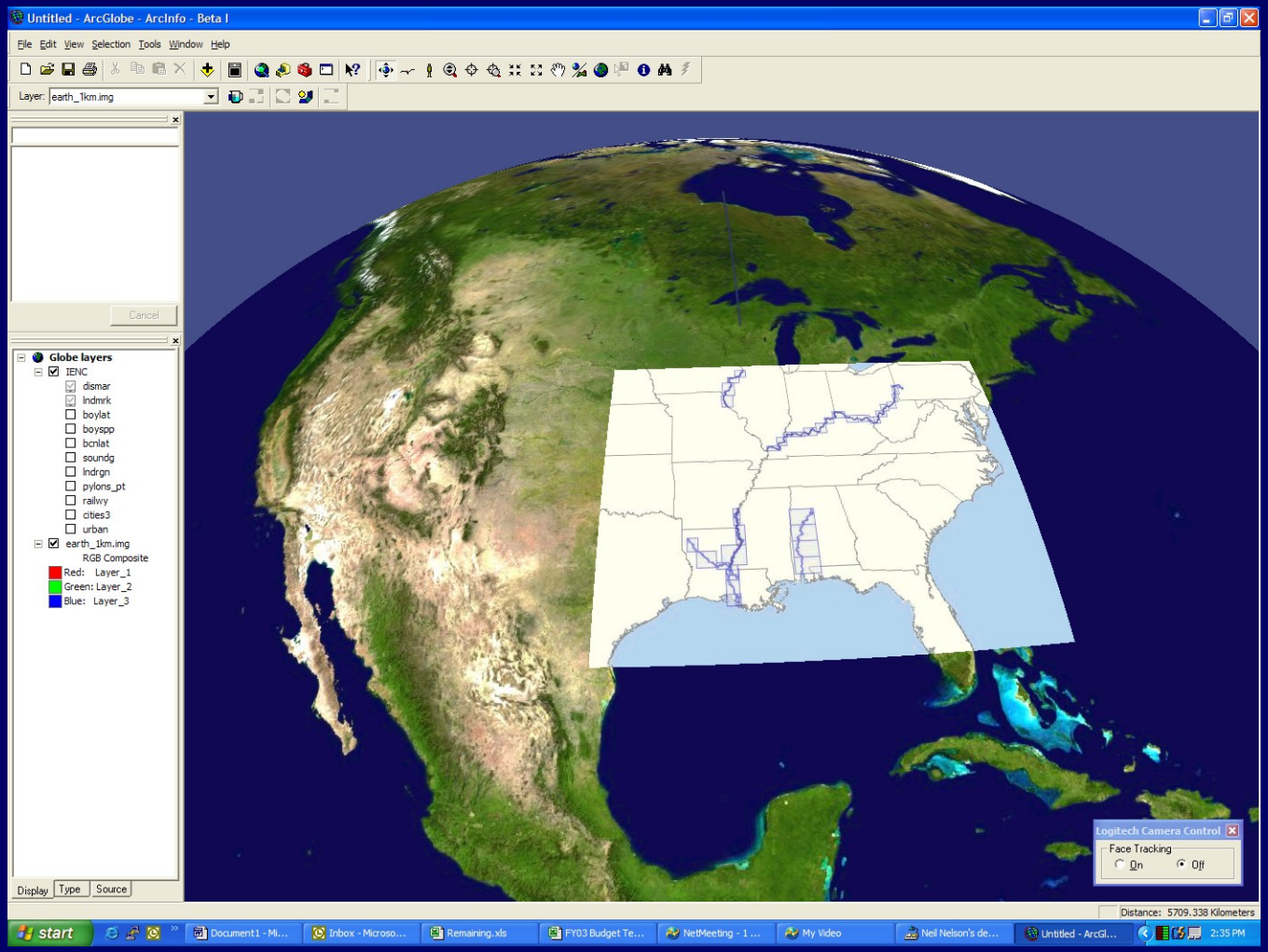
Inland Electronic Data Submitted to Geospatial One Stop and the National Map



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Things to Think About …

- How do We better Leverage Oracle to manage and maintain Real Estate Data?
- CADD vs GIS for interfacing (mapping, editing, etc) Real Estate boundary information
- What does the Digital Boundary Need to Represent?
  - Legal
  - Best Guess
  - Something in Between